

CONTROLLING PARTICLE SIZE IN HIPS USING METAL CARBOXYLATES

Abstract of the Disclosure

It has been discovered that certain compounds serve as particle size
5 regulators when employed together with peroxide initiators for the polymerization
of vinylaromatic monomers in the presence of diene polymers. Suitable com-
pounds that can control particle size include, but are not necessarily limited to,
cobalt naphthenate, zinc naphthenate, iron octoate, calcium octoate, zinc octoate,
zinc neodecanoate, potassium octoate, copper naphthenate, calcium versalate,
10 and the like. Use of these metal carboxylates when vinylaromatic monomers are
polymerized in the presence of polybutadienes and peroxide initiators results in
reduced polybutadiene particles. Grafting and morphology characteristics may
also be improved.